WHAT IS CLAIMED IS

1. A method for de-screening image data, comprising:

generating an estimated screen frequency of the image data;

selecting one or more filters from a filter bank based on only the estimated screen frequency and one or more limit parameters.

2. The method of claim 1, further comprising:

filtering the image data using selected one or more filters from the filter bank; and

blending the one or more filtered image data to form blended image data based on the filter selecting signal.

3. The method of claim 2, further comprising:

sharpening selected portions of blended image data based on luminance of the blended image data.

4. The method of claim 3, the sharpening comprising:

increasing sharpness of a selected portion if a luminance of the selected portion is below a predetermined threshold, a magnitude of sharpness being increased with increasing magnitude of the luminance.

5. The method of claim 1, further comprising:

generating intermediate filter selecting signals based on the estimated screen frequency;

generating a filter selecting signal based on the intermediate filter selecting signals and the one or more limit parameters;

selecting the one or more filters from the filter bank based on the filter selecting signal.

6. The method of claim 2, further comprising:

selecting a luminance component of a portion of the blended image data; and

adjusting the luminance component of the portion of the blended image data based on a sharpness control signal.

7. The method of claim 2, further comprising:

selecting chroma components of a portion of the blended image data; and

adjusting the chroma components of the portion of the blended image data based on a neutral control signal.

8. The method of claim 2, wherein the operations of generating, selecting filtering and blending are performed dynamically.

9. An apparatus to de-screen image data, comprising:

a screen frequency estimater to generate an estimated screen frequency of the image data; and

a filter selector to select one or more filters from a filter bank based on only the estimated screen frequency and one or more limit parameters.

10. The apparatus of claim 9, further comprising:

a filter output blender to blend outputs of one or more filters selected from the filter bank into blended image data.

11. The apparatus of claim 10, further comprising:

an image data sharpener to sharpen selected portions of blended image data based on luminance of the selected portions.

12. The apparatus of claim 11, wherein the image data sharpener increases sharpness of a selected portion if a luminance of the selected portion is below a predetermined threshold, a magnitude of sharpness being increased with increasing magnitude of the luminance.

13. The apparatus of claim 9, wherein the filter selector generates intermediate filter selecting signals based on the estimated screen frequency, and generates the filter selecting signal based on the intermediate filter selecting signals and one or more limit parameters.

14. The apparatus of claim 9, further comprising:

an image data neutralizer to neutralize selected portions of blended image data based on chroma components of the selected portions.

15. A xerographic marking device incorporating the apparatus of claim 9.

16. A scanning device incorporating the apparatus of claim 9.

17. A digital photocopier incorporating the apparatus of claim 9.

18. An apparatus comprising:

means for generating an estimated screen frequency of the image data; and

means for selecting one or more filters from a filter bank based on only the estimated screen frequency and one or more limit parameters.

19. The apparatus of claim 18, further comprising:

means for blending the one or more filtered image data from one or more selected filters into blended image data; and

means for increasing sharpness of a selected portions of blended image data if a luminance of a selected portion is below a predetermined threshold, a magnitude of sharpness being increased with increasing magnitude of the luminance.

20. A storage medium storing a set of program instructions executable on a data processing device, the set of program instructions comprising:

instructions for generating an estimated screen frequency of the image data; and

instructions for selecting a plurality of filters from a bank of filters based on only the estimated screen frequency and one or more limit parameters.